

## SECTION 01950

### RESTORATION AND MAINTENANCE OF EXISTING SURFACES AND UTILITIES

#### PART 1 – GENERAL

##### 1.1 SCOPE OF WORK

- A. The work covered by this section of the specifications consists in furnishing all plant, labor, equipment, appliances and materials; and in performing all operations in connection with the removal, restoration and maintenance of the existing surface area during all phases of construction, complete and in strict accordance with this section of the specifications and the applicable drawings and subject to the terms and conditions of the contract.
- B. Unless specified or directed otherwise, all property and structures within the limits of work shall be cleaned up and restored to a condition of at least equal to that existing prior to construction and to the satisfaction of the Owner, the Engineer and VDOT. All property and structures outside the limits of work and items within the limits of work which are not to be disturbed shall be adequately protected to prevent damage during construction. Any damage resulting from construction shall be repaired by the Contractor at his own expense.
- C. When crossing under and working adjacent to existing utilities, the Contractor will support these utilities by an approved method. The cost of supporting these utilities will be included in the bid price for other items. Any damage to existing utilities will be repaired by the Contractor at his expense. The Contractor will be responsible for digging test pits to locate all underground utilities prior to beginning any construction. The Contractor shall also be responsible for coordination with all utility companies.

##### 1.2 PROTECTION OF EXISTING SURFACE

- A. Public Utility Installations and Structures General Requirements
  - 1. Public utility installations and structures shall be understood to include all poles, pipes, wires, conduits, vaults, manholes, and other appurtenances and facilities, whether owned or controlled by public bodies or private individuals, firms or corporations, used to serve the public with gas, electricity, telephone, storm and sanitary sewers, water, or other public or private utility services. Facilities appurtenant to public or private property which may be affected by the Work shall be deemed included hereunder.

2. The Contract Documents contain data relative to existing public utility installations and structures above and below the ground surface. Existing public utility installations and structures are indicated on the Drawings only to the extent such information was made available to, or discovered by, the Engineer in preparing the Drawings. This data is not guaranteed for completeness or accuracy, and the Contractor is responsible for making his own investigations to fully inform himself of the character, condition, and extent of all installations and structures that may be encountered and that may affect the construction operations.
3. The Contractor shall contact "Miss Utility" sufficiently in advance of the start of construction.
4. The Contractor shall be responsible and liable for any consequential damages done to or suffered by any public utility installations or structures. The Contractor also shall be responsible for any injury, damage, or loss which may result from or be consequent to interference with, or interruption or discontinuance of, any public utility service.
5. Any water, gas, other utilities, or service connections damaged during the Work shall be repaired or replaced by the Contractor at his expense, which shall be deemed included in the Contract Price.
6. The Contractor shall, at all times in performance of the Work, employ proven methods and exercise reasonable care and skill to avoid unnecessary delay, injury, damage, or destruction to public utility installations and structures; and shall avoid unnecessary interference with, or interruption of, public utility services; and cooperate fully with the owners thereof to that end.
7. The Contractor shall give written notice to the owners of all public utility installations and structures affected by his proposed construction operations, sufficiently in advance of breaking ground in any area or on any unit of the Work, to obtain their permission before disturbing the lines and to allow them to take measures necessary to protect their interests. The Contractor must advise the Loudoun County Fire and Rescue Services of any excavation in public streets or the temporary shut-off of any water main. At least 48 hours notice shall be given by the Contractor to all affected property owners whenever service connections are taken out of service.
8. Dominion Virginia Power Lines: This contract calls for work under or near Dominion Virginia Power's overhead lines and conduits along various streets. The contractor shall contact Mr. David Becker, Service Representative, at (703) 359-3377 at least 2 weeks in advance of working

near the power lines. The Contractor shall be responsible for paying all fees associated with the work near the Dominion Virginia Power overhead lines and conduits.

- The Contractor shall adhere to OSHA minimum clearances while performing his work (minimum 10 feet away from the high voltage overhead power lines and any three phase power lines. For further clarification, contact Dominion Virginia Power.
  - Where the work will be in close proximity to an existing power pole or line, the Contractor shall be responsible for coordinating with the power company for stabilization of any power poles or guy wires.
  - Contractor must notify Dominion Virginia Power one week in advance to working near poles which are shown on the plans to be stabilized or braced. Contractor shall coordinate pole stabilization work with Dominion Virginia Power.
9. Washington Gas: The Contractor shall notify Mr. Scott Brown, Prevention Control, at (703) 750-4388, or Mr. Chuck Whitley, at (703) 750-4205, 48 hours in advance of working near any existing gas lines. The Contractor shall maintain minimum 12" clearance between the existing gas lines, 12-inch and smaller, and the water mains. Maintain 24-inches clearance between the existing gas lines, 16-inch and larger, and the water mains. Use hand excavation methods in unearthing the exiting gas line. Excavation using backhoes will not be permitted.

B. Power and Telephone Poles and Wires

1. Protection measures shall include, but not be limited to guying and bracing as required. The Contractor shall request the owning utility to stabilize the poles by guying and bracing as necessary and shall coordinate the work with the owning utility.
2. Relocations, which in the opinion of the engineer are necessary after excavation has begun or is completed, will be performed by the owning utility.
3. Damage to poles, wires and existing utilities will be repaired by the owning utility at the Contractor's expense.

4. When an accidentally damaged utility is considered, in the opinion of the owning utility, of an importance to require 24 hours per day work, provide necessary labor and equipment as required at no additional expense to the owner.

C. Trees, Shrubs and Sod

1. Protect trees, shrubs, sod and other vegetation by conducting construction operations with care.
2. Trim or prune trees to obtain working space in lieu of complete removal when possible. Work shall be done by experienced personnel in accordance with good horticultural practice, and in a manner to preserve natural shape and character. Treat cuts with an approved tree paint.
2. Protect trees and shrubs against damage to trunks from operation of heavy equipment during trimming and pruning operation and from stored or stockpiled materials. Provide tree protection fence where directed by the Owner.
4. Remove damaged items when survival appears doubtful.
5. Where tree removal is called for on the plans or required by the Engineer the Contractor shall completely remove the tree including the stump from the site. The Contractor may utilize a stump grinder to grind the stump where stump removal is not practical as determined and approved by the Engineer. Where necessary the Contractor shall saw cut the downed tree into small pieces at no additional cost as necessary to remove the tree from the property by hand cart, in the event vehicle access is not available for tree removal.

D. Storm Sewers, Water Mains and Underground Pipes and Structures

1. All known storm sewers, water mains and underground pipes shown on the drawings are from available records and as located by So-Deep, Inc. and must be considered approximate and shall be protected by all reasonable measures.
2. Necessary removal and replacement or relocation will be performed as indicated on the plans. Replacement will be with new materials.
3. Repair or replace all damaged pipe and structures as directed by the Owner.

D. Underground Cables

1. Underground power, telephone and other cable shall be protected with all reasonable measures.

2. Accidental damage will be repaired by the owning utility at the Contractor's expense.
  3. The owning utility may, at their option, provide protective measures for their respective ducts and cables during any part of the construction operation.
  4. Ducts and cables that conflict, in the opinion of the Owner, will be relocated by the owning utility.
- E. Existing Fences:
1. Existing fences affected by the Work shall be maintained by the Contractor until completion of the Work. Fences which interfere with construction operations shall not be relocated or dismantled until notification is given to the owner of the fence.
  2. On completion of the Work, the Contractor shall restore all fences to their original or better condition and to their original location unless otherwise directed.
- F. Restoration of pavement is specified in Specifications Section 10 Restoration Within Right of Way.
- G. All walls, planters, stairs, walkways, landscaping and other site amenities disturbed by the Contractor during execution of the work shall be restored substantially to their original condition by the Contractor.
- H. Repair and replace damaged dog fence and irrigation piping to original condition or better.

### 1.3. METHODS OF RESTORATION

A. Disturbed Grass Areas

1. The Contractor shall be responsible for obtaining a permanent stand of grass in all disturbed grass areas.

B. Miscellaneous Structures

1. Restore all driveways, sidewalks, curbs and any other structures damaged during construction operation to their original condition.
2. Replace with new materials where necessary.

#### 1.4 CLEANUP AND RESTORATION

- A. Return construction area to a condition at least equal to its condition before start of the work as directed by the Engineer.

#### 1.5 SECURITY

- A. Preservation of Property:

1. The Contractor shall preserve from damage all property along the line of the Work in the vicinity of or in any way affected by the Work, the removal or destruction of which is not called for by the Drawings. He shall preserve from damage public utilities, trees, lawn areas, building monuments, fences, pipe and underground structures, and public streets. Whenever the Contractor damages such property, he shall immediately restore it to its original condition at his own expense.
2. In case of failure on the part of the Contractor to restore such property or make good such damage or injury, the Owner may, upon 24 hours written notice, proceed to repair, rebuild, or otherwise restore such property as may be deemed necessary, and the cost thereof will be deducted from any moneys due or which may become due the Contractor under this Contract. If removal, repair or replacement of public or private property is made necessary by alteration of grade or alignment authorized by the Owner and not anticipated by the Contract Documents, the Contractor shall be compensated, in accordance with the General Conditions provided that such property has not been damaged through fault of the Contractor or his employees.

#### 1.6 TEMPORARY CONTROLS

- A. During Construction:

1. Keep Site Clear of Debris: During construction of the Work, the Contractor shall at all times keep the Site of the Work and adjacent premises as free from materials, debris, and rubbish and shall remove such from any portion of the Site.
2. Remove Surplus Materials: The Contractor shall remove surplus materials from the site when they are no longer needed.
3. Construction Materials: Construction materials such as concrete forms and scaffolding shall be neatly stacked by the Contractor when not in use. The Contractor shall promptly remove splattered concrete, asphalt, oil,

paint, corrosive liquids, and cleaning solutions from surfaces to prevent marring or other damage.

4. Volatile Wastes: Volatile wastes shall be properly stored in covered metal containers and removed daily.
5. Waste Disposal: Wastes shall not be buried or burned on the Site or disposed of into storm drains, sanitary sewers, streams, or waterways. All wastes shall be removed from the site and disposed of in a manner complying with local ordinances and antipollution laws.
6. Positive drainage is to be maintained at all times
7. The Contractor shall provide for the drainage of stormwater and any water applied or discharged on the Site in performance of the Work. Drainage facilities shall be adequate to prevent damage to the Work, the Site, and adjacent property.
8. Existing drainage channels and conduits shall be cleaned, enlarged, or supplemented as necessary to carry all increased runoff from the Contractor's operations. Dikes shall be constructed as necessary to divert increased runoff from entering adjacent property (except in natural channels), to protect the Owner's facilities and the Work, and to direct water to drainage channels or conduits.
9. Maintain excavations free of water. Provide, operate, and maintain pumping equipment.
10. Provide silt fence, diversion dike and other items, as necessary for sediment and erosion control.

END OF SECTION